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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/805,706	03/22/2004	Oliver Hurst-Hiller	MSFT-2828/306400.01	8718
41505 7590 08/13/2007 WOODCOCK WASHBURN LLP (MICROSOFT CORPORATION) CIRA CENTRE, 12TH FLOOR 2929 ARCH STREET PHILADELPHIA, PA 19104-2891			EXAMINER STACE, BRENT S	
			ART UNIT 2161	PAPER NUMBER
			MAIL DATE 08/13/2007	DELIVERY MODE PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

mn

**Office Action Summary**

Application No.

10/805,706

Applicant(s)

HURST-HILLER ET AL.

Examiner

Brent S. Stace

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2161

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 29 May 2007.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-5, 7-14 and 16-18 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-5, 7-14 and 16-18 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 29 May 2007 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Remarks***

1. This communication is responsive to the Amendment filed May 29<sup>th</sup>, 2007. Claims 1-5, 7-14, and 16-18 are pending. In the Amendment filed May 29<sup>th</sup>, 2007, Claims 1, 3-5, 7, 9-11, 14, 16, and 18 are amended, and Claims 1, 5, 10, 11, 14, and 18 are independent claims. The examiner acknowledges that no new matter was introduced and the amended claims are supported by the specification.

### ***Continued Examination Under 37 CFR 1.114***

2. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 5/29/07 has been entered.

### ***Response to Arguments***

3. Applicant's arguments dated May 29<sup>th</sup>, 2007 with respect to Claims 1-5, 7-14, and 16-18 have been considered but are either moot in view of the new ground(s) of rejection or are not persuasive.

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4. As to Applicant's arguments with respect to Claims 1, 5, 10, 11, 14, and 18 for the prior art(s) allegedly not teaching or suggesting "asking the user [to] evaluate the relationship between his request and the results of his request," the examiner respectfully disagrees. Davallou, in paragraph [0033], teaches "Based on what users retype and the results they get from that modified entry and how much time they spend on the results (or their positive response to a question asking if what they are looking at is what they intended to look for based on their original query which led to no results), new phonetically equivalent formulas may be developed..." Davallou clearly asks the user if "what they are looking at" (results, since results are being "looked for") are what they intended to look for from the user's retyped query (since the retyped query is the only query that yielded results, or at least correct results). New phonetically equivalent formulas may be developed based on the original query, the retyped query and the results found matching what the user was trying to find (information on whether or not the results match is obtained through questions to the user).

5. As to Applicant's arguments with respect to Claims 1, 10, 11, and 18 for the prior art(s) allegedly not teaching or suggesting "prompting the user for information regarding an extent to which a search result corresponds to a search request," the examiner respectfully disagrees. As shown above, Davallou teaches this argument. The "extent" mentioned in the claimed limitation is at least an absolute extent on whether the results (search result) are what they intended (retyped/modified entry query) to look for (e.g. yes/no).

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6. As to Applicant's arguments with respect to Claims 5 and 14 for the prior art(s) allegedly not teaching or suggesting "context-based user feedback data comprising information regarding an extent to which a search result corresponds to a search request," the examiner respectfully submits that this argument is moot in view of the new grounds of rejection below.

7. Any other claims argued merely because of a dependency on a previously argued claim(s) in the arguments presented to the examiner, May 29<sup>th</sup>, 2007, are moot in view of the examiner's interpretation of the claims and art and are still considered rejected based on their respective rejections from prior Office action(s) (part(s) of recited below).

### ***Response to Amendment***

#### ***Drawings***

8. In light of the applicant's respective arguments or respective amendments, the previous drawing objections to the drawings have been withdrawn.

#### ***Claim Objections***

9. In light of the applicant's respective arguments or respective amendments, the previous claim objections to the claims have been withdrawn. However, a new objection is warranted.

10. Claim 10 is objected to because of the following informality:

a. Claim 10 recites "...by submitting one or more questions to the user regarding a performance of the search engine with respect to said search and receiving responses to said questions context-based user feedback data" in lines 11-13. First, "context-based user feedback data" was not underlined denoting new material in the claim. Secondly, this new material does not make sense in context of the claim/sentence. Therefore, it appears to be a copy/paste error, extraneous text, or an unintentional grammatical error. Appropriate correction is required.

***Claim Rejections - 35 USC § 101***

11. In light of the applicant's respective arguments or respective amendments, the previous 35 USC § 101 rejections to the claims have been withdrawn.

***Claim Rejections - 35 USC § 112***

12. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

13. Claims 4 and 9 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

14. Claims 4 and 9 individually appear to be a medium on the method of Claim 1 (or Claim 5). These claims attempt to create a different statutory category of invention

dependent on another category of invention. As such, it is unclear what category of invention the claims are attempting to claim.

***Claim Rejections - 35 USC § 103***

15. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

16. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

17. Claims 1-4, 10-13, and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2002/0107843 (Biebesheimer et al.) in view of U.S. Patent Application No. 2002/0156776 (Davallou).

For **Claim 1**, Biebesheimer teaches: "A method...said method comprising:

- collecting user information from a user having access to said search mechanism;  
[Biebesheimer, paragraph [0030]]
- monitoring of said search mechanism for user behavior data regarding an interaction of said user with said search mechanism to perform a search;  
[Biebesheimer, paragraph [0042]]
- monitoring said search mechanism for search mechanism response data regarding said search; [Biebesheimer, paragraph [0042]]
- acquiring the context-based user feedback data describing said search..."  
[Biebesheimer, paragraph [0029]].

Biebesheimer discloses the above limitations but does not expressly teach: "for improving performance of a search mechanism based on context-based user feedback data

- ...by submitting one or more questions to the user regarding a performance of the search engine with respect to said search and receiving responses to said questions, said questions prompting the user for information regarding an extent to which a search result corresponds to a search request;
- using the context-based user feedback data to identify a problem with the search mechanism; and
- correcting the problem to improve performance of the search mechanism."

With respect to Claim 1, an analogous art, Davallou, teaches: "for improving performance of a search mechanism based on context-based user feedback data [Davallou, paragraph [0033]]



- ...by submitting one or more questions to the user regarding a performance of the search engine with respect to said search and receiving responses to said questions, said questions prompting the user for information regarding an extent to which a search result corresponds to a search request; [Davallou, paragraph [0033]]
- using the context-based user feedback data to identify a problem with the search mechanism; [Davallou, paragraph [0033]] and
- correcting the problem to improve performance of the search mechanism" [Davallou, paragraph [0033]].

It would have been obvious to one of ordinary skill in the art at the time of invention having the teachings of Davallou and Biebesheimer before him/her to combine Davallou with Biebesheimer because both inventions are directed towards using and searching for information in databases that use user data.

Davallou's invention would have been expected to successfully work well with Biebesheimer's invention because both inventions use databases using user data. Biebesheimer discloses a customer self service subsystem for classifying user contexts comprising the acquiring of context-based user feedback data describing a search. However, Biebesheimer does not expressly disclose asking questions about search performance of the database/results and receiving responses nor the explicit use of that data to evaluate performance. Davallou discloses a phonetic self-improving search engine comprising submitting and querying the user about the search results returned.

It would have been obvious to one of ordinary skill in the art at the time of invention having the teachings of Davallou and Biebesheimer before him/her to take the questions, responses, and use from Davallou and install it into the invention of Biebesheimer, thereby offering the obvious advantage of making self-improving search engine with enhanced functionality to provide better search results.

**Claim 2** can be mapped to Biebesheimer (as modified by Davallou) as follows:

"The method of claim 1, where said user information comprises one or more of the following:

- the speed of said user's connection to said search mechanism; [Biebesheimer, paragraph [0036]]
- the type of said user's connection to said search mechanism; [Biebesheimer, paragraph [0073]]
- a classification of said user's use of said search mechanism; [Biebesheimer, paragraph [0030] with Biebesheimer, paragraph [0073]]
- background information concerning said user; [Biebesheimer, paragraph [0030]]  
or
- the language which said user is using to perform said search" [Biebesheimer, paragraph [0073] or Davallou, paragraph [0020]].

**Claim 3** can be mapped to Biebesheimer (as modified by Davallou) as follows:

"The method of claim 1, where said step of collecting said user information comprises:

- requesting said user information from said user; [Biebesheimer, paragraph [0030]] and

- accepting responses from said user” [Biebesheimer, paragraph [0030]].

**Claim 4** encompasses substantially the same scope of the invention as that of Claim 1, in addition to a computer readable storage medium having stored thereon a plurality of computer-executable instructions for performing the method steps of Claim 1. Therefore, Claim 4 is rejected for the same reasons as stated above with respect to Claim 1.

For **Claim 10**, Biebesheimer teaches: “A method...said method comprising:

- monitoring of said search mechanism for user behavior data regarding an interaction of the user having access to said search mechanism with said search mechanism to perform a search, [Biebesheimer, paragraph [0042]] said user behavior data comprising data concerning at least one member of a group comprising: requery performed by said user, [Biebesheimer, paragraph [0027]] dwell time on said results page, click time on said results page, position of result clicked, more results requested by said user, result dwell time result page size, or result page actions; [Biebesheimer, paragraph [0029] or Davallou, paragraph [0033]]
- monitoring said search mechanism for search mechanism response data regarding said search; [Biebesheimer, paragraph [0042]]
- acquiring context-based user feedback data...” [Biebesheimer, paragraph [0029]].

Biebesheimer discloses the above limitations but does not expressly teach: "...for improving performance of a search mechanism based on context-based user feedback data

- ...by submitting one or more questions to the user regarding a performance of the search engine with respect to said search and receiving responses to said questions context-based user feedback data, said questions prompting the user for information regarding an extent to which a search result corresponds to a search request;
- using the context-based user feedback data to identify a problem with the search mechanism; and
- correcting the problem to improve performance of the search mechanism."

With respect to Claim 10, an analogous art, Davallou, teaches: "...for improving performance of a search mechanism based on context-based user feedback data [Davallou, paragraph [0033]]

- ...by submitting one or more questions to the user regarding a performance of the search engine with respect to said search and receiving responses to said questions context-based user feedback data, said questions prompting the user for information regarding an extent to which a search result corresponds to a search request; [Davallou, paragraph [0033]] and
- using the context-based user feedback data to identify a problem with the search mechanism; [Davallou, paragraph [0033]] and

- correcting the problem to improve performance of the search mechanism"  
[Davallou, paragraph [0033]].

It would have been obvious to one of ordinary skill in the art at the time of invention having the teachings of Davallou and Biebesheimer before him/her to combine Davallou with Biebesheimer because both inventions are directed towards using and searching for information in databases that use user data.

Davallou's invention would have been expected to successfully work well with Biebesheimer's invention because both inventions use databases using user data. Biebesheimer discloses a customer self service subsystem for classifying user contexts comprising the acquiring of context-based user feedback data describing a search. However, Biebesheimer does not expressly disclose asking questions about search performance of the database/results and receiving responses nor the explicit use of that data to evaluate performance. Davallou discloses a phonetic self-improving search engine comprising submitting and querying the user about the search results returned.

It would have been obvious to one of ordinary skill in the art at the time of invention having the teachings of Davallou and Biebesheimer before him/her to take the questions, responses, and use from Davallou and install it into the invention of Biebesheimer, thereby offering the obvious advantage of making self-improving search engine with enhanced functionality to provide better search results.

**Claims 11-13** encompass substantially the same scope of the invention as that of Claims 1-3, respectfully, in addition to a system and some elements for performing

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the method steps of Claims 1-3, respectfully. Therefore, Claims 11-13 are rejected for the same reasons as stated above with respect to Claims 1-3, respectfully.

**Claim 18** encompasses substantially the same scope of the invention as that of Claim 10, in addition to a system and some elements for performing the method steps of Claim 10. Therefore, Claim 18 is rejected for the same reasons as stated above with respect to Claim 10.

18. Claims 5, 7-9, 14, 16, and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application No. 2002/0156776 (Davallou) in view of U.S. Patent No. 6,434,547 (Mischelevich et al.).

For **Claim 5**, Davallou teaches: "A method for improving performance of a search mechanism based on context-based user feedback data, [Davallou, paragraph [0033]] said method comprising:

- monitoring of said search mechanism for user behavior data regarding an interaction of a user having access to said search mechanism with said search mechanism to perform a search; [Davallou, paragraph [0033]]
- monitoring said search mechanism for search mechanism response data regarding said search; [Davallou, paragraph [0033]]
- ...acquiring context-based user feedback data describing said search, said context-based user feedback data comprising information regarding an extent to which a search result corresponds to a search request, said context-based user

feedback data further comprising said explicit feedback data if said explicit user feedback data was collected; [Davallou, paragraph [0033]]

- using the context-based user feedback data to identify a problem with the search mechanism; [Davallou, paragraph [0033]] and
- correcting the problem to improve performance of the search mechanism" [Davallou, paragraph [0033]].

Ruppelt discloses the above limitations but does not expressly teach:

- "...determining if a snooze request specifying a time period to suspend collection of explicit feedback data is in effect from said user, and, if not, collecting explicit feedback data from said user."

With respect to Claim 5, an analogous art, Mishelevich, teaches:

- "...determining if a snooze request specifying a time period to suspend collection of explicit feedback data is in effect from said user, and, if not, collecting explicit feedback data from said user" [Mishelevich, cols. 8-9, lines 62-5 with Mishelevich, cols. 10-11, lines 63-22 with Davallou, paragraph [0033]].

It would have been obvious to one of ordinary skill in the art at the time of invention having the teachings of Mishelevich and Davallou before him/her to combine Mishelevich with Davallou because both inventions are directed towards prompting users for information.

Mishelevich's invention would have been expected to successfully work well with Davallou's invention because both inventions use computers for data input. Davallou discloses a phonetic self-improving search engine (title) comprising asking questions

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regarding the user's search. However, Davallou does not expressly disclose a snooze request with a time period to suspend data collection. Mishelevich discloses a data capture and verification system (title) comprising elements and actions equating to "determining if a snooze request specifying a time period to suspend collection of explicit feedback data is in effect from the user, and, if not, collecting explicit feedback data from the user."

It would have been obvious to one of ordinary skill in the art at the time of invention having the teachings of Mishelevich and Davallou before him/her to take the pausing from different inputs and rhythm/rates from Mishelevich and install it into the invention of Davallou, thereby offering the obvious advantage of facilitating data entry.

**Claim 7** can be mapped to Davallou (as modified by Mishelevich) as follows:

"The method of claim 5, where said step of determining if a snooze request is in effect from said user comprises:

- determining if said user has issued a snooze request; [Mishelevich, cols. 8-9, lines 62-5 with Mishelevich, cols. 10-11, lines 63-22] and
- determining if an associated time period associated with said snooze request has elapsed" [Mishelevich, cols. 8-9, lines 62-5 with Mishelevich, cols. 10-11, lines 63-22].

**Claim 8** can be mapped to Davallou (as modified by Mishelevich) as follows:

"The method of claim 5, further comprising:

- storing target data concerning a target value for how often explicit feedback should be collected for searches; [Mishelevich, col. 11, lines 5-10] and



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- allowing explicit feedback to be collected only if collecting the explicit feedback would not result in exceeding said target value for how often explicit feedback is collected” [Mishelevich, cols. 10-11, lines 63-22 with Davallou, paragraph [0033]].

**Claim 9** encompasses substantially the same scope of the invention as that of Claim 5, in addition to a computer readable storage medium having stored thereon a plurality of computer-executable instructions for performing the method steps of Claim 5. Therefore, Claim 9 is rejected for the same reasons as stated above with respect to Claim 5.

**Claim 14** encompasses substantially the same scope of the invention as that of Claim 5 in addition to a system and some elements for performing the method steps of Claim 5. Therefore, Claim 14 is rejected for the same reasons as stated above with respect to Claim 5.

**Claims 16 and 17** encompass substantially the same scope of the invention as that of Claims 7 and 8, respectfully, in addition to a system and some elements for performing the method steps of Claims 7 and 8, respectfully. Therefore, Claims 16 and 17 are rejected for the same reasons as stated above with respect to Claims 7 and 8, respectfully.

**Conclusion**

19. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Brent S. Stace whose telephone number is 571-272-8372 and fax number is 571-273-8372. The examiner can normally be reached on M-F 9am-5:30pm EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Apu M. Mofiz can be reached on 571-272-4080. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Brent Stace *B.S.*

*[Signature]*  
APU MOFIZ  
SUPERVISORY PATENT EXAMINER

*[Handwritten mark]*